

Historic, Archive Document

Do not assume content reflects current scientific knowledge, policies, or practices.

27A8
2p.5

THE AGRICULTURAL • SITUATION

FEBRUARY 1941

A Brief Summary of Economic Conditions

Issued Monthly by the Bureau of Agricultural Economics, United States Department of Agriculture

Subscription price, 50 cents per year; single copy, 5 cents; foreign price, 70 cents; payable in cash or money
order to the Superintendent of Documents, Government Printing Office, Washington, D. C.

VOLUME 25 - NUMBER 2 - WASHINGTON, D. C.



IN THIS ISSUE

Commodity Reviews:		Page
Domestic Demand.....	P. H. Bollinger	2
Income, Prices, etc.....	Frank George	2-8
Supplemental Cotton Program.....		8
The Farmer's Share of the Food Dollar.....	R. O. Been	9
Interstate Trade Barriers: A Proposal.....	F. V. Waugh	13
Income by Types of Farming.....	W. D. Goodsell	16
Forests for Conservation and Use.....	Alan Macdonald	19
What's Ahead for American Agriculture?.....	O. C. Stine	22
Hog Production and Income (charts).....		23

PRICES OF FARM PRODUCTS average the highest since 1937. But farmers—except in the livestock industries—have little to sell at this time of year, and cash farm income in February is usually the smallest for the year. Meanwhile, farmers plan their 1941 production of cash and feed crops, and the prospects are that costs of production will be higher this year. Already, farmers are having to pay higher wages to hired hands. And they have been employing more hired hands this winter than last. * * * Domestic consumer demand continues to improve, especially for farm commodities produced practically entirely for home consumption. Domestic consumption of cotton also has increased, but of course not enough to make up for the loss of export markets. More tobacco will probably be consumed in the United States this year, but here also not enough to offset the loss of export markets. * * * Total cash farm income is expected to increase this year, but in smaller proportion than the increase in industrial income. Most of the increase will go to the producers of domestic as contrasted with export farm products.

Commodity Reviews

DEMAND: Better

DOMESTIC demand for farm products continues to improve. The general index of prices received by farmers is the highest since 1937—this despite the high record production of farm commodities during the past year and the virtual loss of export markets. The effect of improving domestic demand has been particularly manifested in prices of meat animals, dairy products, poultry products, and apples.

Industrial activity may not rise by the usual seasonal amount in the next few months, but the actual rate of operations is expected to remain high enough to maintain the improved domestic demand for farm products. Later in the year a further substantial increase in industrial output is expected, largely because of the national defense and related programs.

Defense, factory, cantonment, and other building programs already are furnishing employment—directly and indirectly—to an increasing number of workers. These preparatory programs will gradually become subordinate to the output of military equipment, tanks, guns, airplanes, and munitions, as new productive facilities become available. Industrial activity and consumer income probably will be stimulated even more by the actual production of war materials than by the building and equipping of plants.

Some idea of the probable future effect of defense activities may be had from the increase in defense expenditures which will be necessary if intentions, as set forth in the President's budget message to Congress, are to be realized. To reach minimum budget estimates, defense expenditures will have to approximate 900 million dollars a month in the fiscal year to begin next July, as compared with about 560 million in January of this

year and 132 million dollars in January a year ago. Actually, the rate of increase in expenditures is likely to be limited more by the inability to produce the needed products than by the amount of funds available.

The prospective increases in non-agricultural employment and consumer income in 1941 may result in the largest cash farm income since 1930. However, the loss of export markets will prevent farm income from rising as much as might otherwise be expected in relation to total national income. The gain in farm purchasing power will be limited also by the rising prices of goods and services bought by farmers.

P. H. BOLLINGER.

INCOME: Maintained

Farm cash income will probably be about the same in the first quarter of this year as last, even though the volume of farm marketings is smaller. Much of the 1940 cotton and wheat crops has already been sold or placed under Government loan, and hog marketings from the 1940 spring pig crop were unusually large during the last quarter of 1940. But the smaller farm marketings of crops and livestock during the first quarter of 1941 compared with 1940 may be offset by higher prices.

Total cash farm income from marketings and Government payments totaled 9,094 million dollars for the full year of 1940, compared with 8,518 million dollars in 1939. Income from crops marketed or put under loan totaled 3,504 million dollars in 1940, compared with 3,238 million in 1939; income from livestock and livestock products totaled 4,821 million as compared with 4,473 million in 1939.

All major groups of crops except tobacco shared in the increase in

income last year, and all groups of livestock shared in the gain in that division. Returns from grains and cotton showed the greatest percentage increases among the crops. Income from meat animals and dairy products was substantially higher than in 1939, and income from poultry and eggs recorded a slight increase. Government payments totaled 766 million dollars in 1940, compared with 807 million dollars in 1939.

prices received by farmers was 104 percent of the 1910-14 average, but the index of prices paid by farmers was 123 percent of the base period. The ratio of prices received to prices paid was 85 percent of the pre-World War base period of 100. This compares with 83 in December, and with 81 in January last year.

Index Numbers of Prices Received and Paid by Farmers

[1910-14=100]

Month and year	Income from marketings	Income from Government payments	Total	Year and month	Prices received	Prices paid	Buying power of farm products ¹
December:							
1940-----	767	70	837	January-----	99	122	81
1939-----	710	91	801	February-----	101	122	83
1938-----	639	39	678	March-----	97	123	79
1937-----	729	8	737	April-----	98	123	80
January-December:				May-----	98	123	80
1940-----	8,328	766	9,094	June-----	95	123	77
1939-----	7,711	807	8,518	July-----	95	122	78
1938-----	7,600	482	8,082	August-----	96	122	79
1937-----	8,744	367	9,111	September-----	97	122	80

PRICES: Higher

The average of prices of farm products in mid-January was the highest since November 1937. The index of

¹ Ratio of prices received to prices paid.

Prices of Farm Products

Estimates of average prices received by farmers at local farm markets based on reports to the Agricultural Marketing Service. Average of reports covering the United States weighted according to relative importance of district and States.

Product	5-year average, August 1909-July 1914	January 1910-14	January 1940	December 1940	January 1941	Parity price, January 1941
Cotton, lb.-----cents	12.4	12.2	10.1	9.33	9.45	15.87
Corn, bu.-----do	64.2	58.9	53.2	54.5	56.0	82.2
Wheat, bu.-----do	88.4	88.4	84.5	71.5	73.0	113.2
Hay, ton.-----dollars	11.87	11.87	7.90	7.53	7.78	15.19
Potatoes, bu.-----cents	69.7	64.2	74.0	54.9	54.6	87.6
Oats, bu.-----do	39.9	39.0	36.3	32.3	33.3	51.1
Rice, bu.-----do	81.3	-----	72.5	76.3	87.9	104.1
Tobacco, lb.-----do	-----	22.9	11.4	12.1	11.7	22.4
Flue-cured, types 11-14-----do	-----	22.2	17.3	17.3	15.5	21.8
Burley, type 31-----do	-----	1.00	.73	.86	.90	1.23
Apples, bu.-----dollars	.96	5.21	6.94	7.56	8.09	6.67
Beef cattle, cwt.-----do	7.22	7.03	5.18	5.59	7.26	9.24
Hogs, cwt.-----do	11.4	10.8	12.0	13.0	13.7	14.6
Chickens, lb.-----cents	21.5	28.0	18.3	26.8	19.7	329.9
Eggs, doz.-----do	26.3	29.2	30.0	34.8	31.1	335.6
Butterfat, lb.-----do	18.3	18.5	28.1	31.2	31.3	23.4
Wool, lb.-----do	6.75	6.78	8.95	9.01	9.70	8.64
Veal calves, cwt.-----dollars	5.87	5.79	7.57	7.88	8.34	7.51
Lambs, cwt.-----do	136.60	133.70	78.30	69.10	70.20	174.80

¹ Post-war base.

² 1934-38 base.

³ Adjusted for seasonality.

Principal groups of farm products selling higher this January than last included fruits, meat animals, dairy products, and chickens and eggs. Groups selling lower included grain, cotton and cottonseed, and truck crops. Largest gains during the last month of record were in prices of meat animals. Prices of hogs went up 30 percent during this period. Largest declines were in prices of eggs and dairy products.

FARM WAGES: Up

Farmers have been paying higher wages this winter than last, as the competitive demand for workers in industry has increased. Wages of day and month farm workers combined on January 1 were 124 percent of the 1910-14 average, as compared with 119 percent at the same time a year earlier. January figures showed more hired workers on farms this winter than last. The ratio of prices received by farmers for their products to farm wage rates was 81 in January this year, compared with 83 a year earlier. The period 1910-14 equals 100.

COTTON: Prices Up

Prices of cotton average only slightly lower than at this time last year. Recent gains carried spot prices still further above the Government loan rate; nevertheless the quantity of the 1940 crop going into the loan continued to increase. By the end of January approximately 3 million bales of the 1940 crop were under Government loan, in addition to about 8 million bales from preceding years.

Increasing domestic mill consumption has been an important stimulant to cotton prices, counteracting some of the adverse effects of a shrinking volume of exports. Exports to date this year have been the smallest since 1868. At the current rate of exports the volume of shipments for the full

year 1940-41 will be little more than a million bales. This would put the business back to the early days of the cotton industry in this country.

Domestic mill consumption is expected to continue large during the next few months, since mills are well booked in advance. Mill activity in England has been little affected by the air raids, but in Japan the output of mills has been greatly restricted.

British mills have been working on large Government orders and a fairly active demand for textiles from the Dominions and South America.

WHEAT: Lower

Wheat has been selling lower this winter than last, reflecting a somewhat larger total supply, a poor export demand, and prospects for another good winter wheat crop to be harvested next summer. A stabilizing factor, of course, has been the Government loan, which has limited the supply of wheat in commercial channels.

The Government had about 290 million bushels of wheat under loan on January 1—280 million bushels of the 1940 crop, plus 10 million of the 1939 crop. Of the total, about 230 million bushels were in warehouses and the remainder on farms. Warehouse loans, which were made for a period of 8 months, or not later than April 30, begin to expire this month.

It is not expected, however, that markets will be oversupplied, because if prices are not above loan values plus costs at the maturity of the loans the Government will take delivery of the wheat. The Commodity Credit Corporation has announced that insofar as practicable it will not sell any 1940 crop wheat that is in good condition, except at prices at least at loan values plus charges. On 1940 farm-stored grain an extension beyond the original loan period of 10 months is available in areas where it is known the grain will store without deterioration.

FLAXSEED: Expansion

United States production of flaxseed has increased greatly in recent years. Total was 31.1 million bushels in 1940, compared with 20.2 million in 1939 and with 10.9 million average for the 10 years 1929-38. Acreage has been increased both within and outside the normal flax-producing areas in this country. Production in California and Arizona, mostly on irrigated land, has shown a sharp upward trend in recent years, and in 1940 accounted for nearly 10 percent of total United States production. The indicated acreage for 1941 points to a 52 percent increase in California and a 15 percent increase in Arizona.

The United States has been on a net importing basis for flaxseed for more than 30 years. Imports in recent years, principally from Argentina and Uruguay, have averaged about 15 million bushels annually. With the large supply now available from domestic sources, imports in the current marketing year may total no more than a third the usual quantity, even though domestic crushings may be somewhat larger this season than last.

FEED: Lower Priced

Feed grains (except corn) have been lower priced this winter, reflecting the large supply available for the reduced number of animals on farms. Corn has been higher priced, supported by the Government loans. The 1940 corn crop was of lower quality than the 1939 crop; consequently, there has been a much wider spread between prices of the better and the lower grades.

Stocks of corn on January 1 totaled 2.0 billion bushels. Of this, about 473 million bushels were under Government loan or ownership. Stocks on the same date a year earlier were about 50 million bushels larger, and of the total only 270 million bushels were held by the Government. Less corn is being fed this season (principally on account of the smaller number

of hogs), and the carry-over on October 1 next will probably be the largest on record.

CATTLE: Increase

An increase in marketings of fed cattle this spring and summer as compared with the like period in 1940 is indicated by an 11-percent increase in the number of cattle on feed this January 1 compared with a year earlier. Meanwhile, consumer demand for meats continues to improve and the prospect is that cattle prices will be higher in the first half of 1941 than in the same period of 1940. The number of cattle on feed this January 1 was close to the largest on record for that time of year.

Usually there is a seasonal decline in cattle prices in late summer and fall. Available information suggests that this year the peak in marketings of well-finished fed cattle may not occur until September or later and that marketings may continue relatively large throughout the fall months. Under these circumstances, it is possible that the improvement in cattle prices relative to a year earlier will be less pronounced in the fall and winter than in the spring and summer of 1941.

Inspected cattle slaughter during 1940 totaled about 3 percent larger than in 1939. The increase over 1939 appears to have been largely in steers, since farmers and ranchers continued to hold back breeding stock to increase herds.

HOGS: Higher

Higher prices for hogs are seen in the current supply and demand situation. Prices have advanced sharply from the low figures of last fall, reflecting a sharp decrease in marketings of hogs currently and in prospect. The 1940 pig crop totaled 77.0 million head, as compared with the high record crop of 85.9 million in 1939, and a sharp reduction in the spring pig crop this year compared with last

was indicated by farmers' reports in December.

Continued improvement in the hog-corn price ratio this month would suggest that the decrease in the number of sows farrowed this spring may be somewhat less than the 14 percent indicated by farmers in December. In any case, it is likely that hog prices relative to corn prices will continue to advance to the extent that the ratio will be favorable for hog production this spring and summer. This would forecast an increase in the 1941 fall pig crop as compared with the 1940 fall crop.

Total production of pigs—spring and fall crops combined—in 1941 will probably be smaller than production in 1940. So much for current and prospective production and marketings. Add to this a considerable improvement in domestic demand for pork and lard this year and the total spells higher prices, even though the outlook for exports of pork and lard continues poor.

LAMBS: Increase

A moderate increase in market supplies of lambs is expected during the next few months as contrasted with the like period in 1940. But the increased supply will be favored by an improved consumer demand for meats, and prices may be higher than in 1940. The larger supply is indicated by an increase of 6 percent in number of sheep and lambs on feed this January 1 compared with last. The number on feed this winter was the largest on record.

Most of the increase was in the Corn Belt States, although the total in States outside the Corn Belt also was somewhat larger. Increases were reported in seven Corn Belt States, and decreases in four. Largest increases were in Iowa and Kansas; largest decrease, in Nebraska. In the western sheep States (including Texas, Oklahoma, and North Dakota) the number of lambs on feed was a little larger this January 1 than last.

A decrease of 10 percent in Colorado was more than offset by increases in eight other Western States. The number on feed in Colorado was the smallest since 1927. * * * Weather conditions up to January 1 in most areas were less favorable than during the comparable period in 1939.

WOOL: Higher

Outlook is for a higher average of prices for the 1941 wool clip as compared with 1940. Principal factor is the continued heavy consumption of wool by mills to fill Government orders. A limiting one is the heavy volume of imports this season. Any advances in prices from January levels will probably be moderate, but prices will likely average higher this spring and summer than last.

Wool produced in Australia, New Zealand, and the Union of South Africa is under control of the British Government and is being sold at prices fixed by that Government. United States imports of wool have been large, but so has domestic consumption, and the United States carry-over of apparel wool into the 1941 season is likely to be relatively small. The carry-over on April 1 last, totaling 180 million pounds, grease basis, was the smallest in recent years.

The United States, Great Britain, and Japan are now the only important markets for wool exports from the Southern Hemisphere.

FRUITS: Higher

Prices of most fruits have averaged higher this winter than last in response to three important factors: smaller crops, improved consumer demand, and large purchases of fresh fruit by the Surplus Marketing Administration in an effort to offset the adverse effects of lost export markets. The spread in prices this season compared with last is likely to widen as consumer buying power increases. Apples es-

pecially have been in a strong price position.

Production estimates for oranges and grapefruit have been lowered since late fall, but the January 1 estimated total for these fruits was 4.7 million tons, as compared with 4.3 million tons last year. Auction prices of early and midseason Florida and California oranges were higher than a year ago in early January; prices of Texas grapefruit advanced, following reports of wind damage in that State.

TRUCK CROPS: Question

Average of truck crops in the winter vegetable producing areas of the South and in California are larger this season than last. Barring severe weather losses, market supplies should be considerably larger than in early 1940. Prices went up fast in January, however, following reports of heavy rains in these areas.

These rains retarded the development of some truck crops, but the much-needed moisture may prove beneficial in the long run so far as the production of crops is concerned. Favorable weather now will result in increased marketings and, of course, lower prices. For late winter and early spring the prospects are for larger crops of artichokes, snap beans, beets, carrots, cauliflower, eggplant, kale, lettuce, onions, peppers, spinach, and tomatoes this year than last. The supply of early cabbage, celery, and cucumbers probably will be slightly smaller.

Unless weather conditions are unfavorable, as they were last winter, prices during the early part of 1941 are likely to average much below those of early 1940.

POTATOES: Low Priced

An unusually large supply of potatoes plus prospects for larger early crops this season than last has been

a price deterrent this winter. Stocks on January 1 totaled about 119 million bushels, as compared with 104 million a year earlier and with 102 million average for the 10 years 1930-39. Reports have been that growers intended to plant a slightly larger acreage this season than last in the first section of early States,—north Florida, and the lower valley of Texas.

Different has been the situation as to sweetpotatoes, prices having advanced more than is usual, since marketings of the relatively short storage supplies have been correspondingly small. Storage holdings are much smaller than at this time last year, and a good level of prices is expected during the remainder of the marketing season. Another factor on the up side has been the improved consumer demand this winter.

DAIRY: Record

All former high records of production of milk and dairy products have been broken this winter. This situation is likely to continue, since there are large numbers of cows on farms and plenty of feed. Farm prices of dairy products have been the highest since 1937; farm income from dairying this year may be the largest in a decade.

Production of milk will increase sharply next month and by June may reach a peak higher than at any previous time in 17 years of record. The total of milk production in June will probably be close to 12 billion pounds. This would compare with 11.8 billion in 1940, with 11.5 billion in 1939, and 11.0 billion average for the 10 years 1929-38. This quantity does not appear excessive, in view of the good consumer demand for milk and dairy products.

Government and private agencies are engaged in many ways in trying to increase the use of milk by consumers. It is reported that 2-quart containers are now being used in 16 cities the

country over. Prices range from one-half to 3 cents less than for milk in single-quart containers. Some markets are using 4-quart containers.

POULTRY: Marketings

Latest reports indicate that farm marketings of poultry will be moderately smaller during the next few months, as contrasted with the same period last year, but that receipts of poultry at the principal markets may be about the same as in early 1940, since a heavy intermarket movement of storage poultry is expected. Storage stocks of poultry are the largest on record. The bulk of these stocks consists of turkeys, fowls, and roasters.

Farmers have been getting higher prices for chickens this winter than last, largely because of improved consumer demand. Chicken prices in general are expected to average higher than prices a year earlier during the next few months. * * * For the first time in nearly 2 years prices of turkeys have been higher than a year earlier. Prices of turkeys may continue higher throughout 1941, and it is not unlikely that production will be increased this year.

EGGS: Production

Production of eggs has been about the same this winter as last, a small reduction in December being followed by some increase in January, as indicated by marketings and out-of-storage movements. There were about 2 percent fewer layers on farms this January 1 than last, but in terms of egg production this difference could be canceled by a long spell of good weather. In any case, the feed-egg price ratio is expected to be more favorable during the next few months of heavy seasonal production this year than last. This would result in an increase in number of chickens raised this year.

(Production of eggs on farms in 1940 was the largest in 10 years. The total was 38,892 million eggs. Largest production on record was 39,067 million in 1930. The increase in production of eggs in recent years has been due mainly to increased production in the fall and winter months—November through February. Many commercial flocks now produce the largest proportion of their eggs during the winter months, when egg production generally is at its low point for the year and egg prices are highest.)

FRANK GEORGE.

Supplemental Cotton Program

A supplementary cotton program for voluntary reduction of cotton acreage below the 1941 national acreage allotment, and for increased consumption of cotton goods, to be brought about by compensating cotton farmers for their additional acreage reduction with cotton stamps which may be used to purchase cotton goods, was announced last month by Secretary Wickard.

The program is to be accompanied by an intensive campaign to encourage improved living standards through more gardens and food and feed produc-

tion for home consumption. It does not change in any way the basic conservation and parity programs already in effect under the AAA.

The program will be carried out by the Agricultural Adjustment Administration and the Surplus Marketing Administration. The AAA will administer the program in the States and counties and the SMA will provide and redeem up to 25 million dollars' worth of cotton stamps which farmers will receive for their voluntary reduction.

Farmers will receive stamps for planting less than their 1941 allotments

on their 1940 measured acreage, whichever is lower, at the rate of 10 cents a pound times the normal yield of the underplanted acreage, up to \$25 per family in the case of sharecroppers, tenants, and owner-operators. Owners of more than one farm or of a farm operated by more than one tenant may qualify for up to \$50 worth of the stamps, based upon their share of the crop.

The following is an example of how the new program would operate in the case of a farmer with a 10-acre allotment in 1941, who planted 10 acres in 1940, and who had a normal yield of 250 pounds per acre:

This farmer, if he planted within his acreage allotment of 10 acres, would receive full conservation and parity payments available under the program. However, if he wished to participate in the supplementary program, he could reduce his plantings by 1 acre, or have a total of 9 acres. For the acre reduced he would receive cotton stamps at the rate of 10 cents per pound for the 250 pound normal yield, or \$25 worth. He could then exchange the stamps at his local retail store for cotton goods. The merchant would redeem the stamps, at face value, from the Surplus Marketing Administration.

The Farmer's Share of the Food Dollar

THE farmer's share of consumer expenditures for domestic food products continued to increase through 1940. For a selected list of important food items, the farmer's share of the consumer's dollar rose from 40 cents in 1938 and 41 cents in 1939 to 42 cents in 1940. This rise in the farmer's share must be attributed in large part to a continued decline in the middleman's charges for marketing services, since there was no significant advance in retail food prices.

The marketing of food products involves a variety of middlemen's services required to transfer these products from the farmer to the consumer. These services include local assembly, transportation, storage, processing, and wholesale and retail distribution. Charges for these marketing services make up the total spread between the price paid by the consumer at retail and the price received by the farmer for equivalent quantities of farm products. In table 1 are shown data on prices and marketing margins for 58 important retail food items combined into a single group representing annual family purchases.

Interest never wanes in the consumer's food dollar. Everyone wants a slice of it. The farmer gets a share, and out of this portion he must pay the costs of production. Transportation agencies, processors, and distributors get a share—and they have expenses, too. Interest in the consumer's food dollar is especially keen just now to see that its buying power does not shrink unduly, and that the portions going to the various agencies of production and distribution are maintained in proper balance.

The portion of the consumer's food dollar going to each group has never been perfectly measured, but the Bureau of Agricultural Economics does make at least a rough separation by way of indicating the share the farmer gets—at one time as compared with another—and the portion going to the remaining groups. The latest analysis, covering the last 2 years against the statistical record of the preceding 15, is given in the accompanying article.—ED.

IN 1940 the consumer paid \$314 for the list of 58 foods. Of this amount, \$182 was retained by middlemen to cover charges for their services, leaving

\$132 as payments to farmers for sales of food products. At the price levels ruling in 1940, the farmer received less for the sale of this group of products than he did in any of the 3 years 1913-15, preceding the first World War, while the consumer was obliged to pay substantially more for these foods at retail.

Table 1.—58 Foods Consumed Annually by a Typical Workingman's Family—Values at the Farm and at Retail, and the Marketing Margin

Year	Farm value	Retail value	Margin	Farm value as percentage of retail value
	<i>Dollars</i>	<i>Dollars</i>	<i>Dollars</i>	<i>Percent</i>
1913	134	252	118	53
1914	137	258	121	53
1915	134	258	124	52
1916	155	285	130	54
1917	223	370	147	60
1918	245	424	179	58
1919	267	470	203	57
1920	272	514	242	53
1921	179	404	225	44
1929	195	415	220	47
1932	88	270	182	33
1937	160	353	193	45
1938	130	321	191	40
1939	126	311	185	41
1940	132	314	182	42

Source: Farm prices from the Agricultural Marketing Service; retail prices from U. S. Bureau of Labor Statistics.

At \$314 the consumer expenditure for 58 foods in 1940 was 1 percent higher than in 1939 and 2 percent below expenditures in 1938. This 1940 retail value was 22 percent higher than the expenditure of \$258 required for the same foods in 1915, nearly 40 percent below the record level of \$514 reached in 1920, and 16 percent above the depression level of \$270 in 1932.

During the 1920's, total charges for marketing services represented by the margin changed but little and were maintained at a level of about \$215. During the latter part of the decade of the 1930's the marketing margin was quite stable at near \$190. Through

the last 4 years, 1937 to 1940, the margin has been consistently declining, dropping from \$193 in 1937, \$191 in 1938, and \$185 in 1939, to \$182 in 1940. Marketing charges for 1940 reached the lowest level since the depression of the early 1930's, and were exceeded in all years but 2 since 1918. This decrease in middlemen's margins occurred in the face of increases in certain costs such as hourly wage rates.

A part of the contraction in margins which has occurred since 1935 may have resulted from a gradual elimination of additional charges designed to cover the processing taxes of 1933-36, which amounted to as much as \$11 on the family purchases of 58 foods.

With a decline of \$3 in the marketing margin and a rise of \$3 in retail value, the farm value of 58 foods rose by \$6, or 5 percent, from 1939 to 1940. The farm value was \$132 in 1940, slightly above the \$130 for 1938 but 18 percent below the \$160 received in 1937. Because of the relative inflexibility in charges for marketing services, variation in consumer expenditures for food at retail are passed back to the farmer in the form of relatively severe fluctuations in farm value.

IN table 2 the 58-food composite value and margin series are shown on an index basis by months for the 2 years 1939-40. August 1939 is chosen as the base for these indexes so that they represent variations in level of prices and marketing charges from the level immediately preceding the European War. After the initial rise of 5 percent in retail value during the first month of the war, retail food prices have persisted at about the same level, dropping by 3 percent to January 1940 but never rising above September 1939, and even during the last months of 1940 no appreciable upward trend was evident. Charges for marketing services represented by the margin have averaged well below the pre-war level with irregular monthly variation.

The level of farm prices represented in farm value of 58 foods has been substantially higher than in August 1939, due in part to the level of retail prices but in large measure to the decline in the marketing margin. The position of the farmer continued to improve in the late months of 1940, the farm value in December of 1940 rising to 20 percent above August 1939. During late 1940 the farmers' share of the retail value showed a corresponding increase, reaching 45 percent in December.

In general, retail and farm price changes for individual items are similar to changes for the 58-food composite, the advance in farm prices being relatively greater than any increase in retail prices. After rising during the middle of 1940, the retail price per pound of white bread declined to 7.8 cents in December 1940. Prices of dairy products, of butter in particular, were higher in 1940 than in the corresponding months of 1939. The farm price of eggs more than kept pace with the retail price advance during the late months of 1940. In contrast to the stability in bread price, the retail price of white flour rose by 13 percent from 1939 to 4.3 cents per pound in 1940. The retail price of dry beans has retained a large part of the advance which occurred at the outbreak of the war, while the price paid to farmers lost most of the initial rise. Retail prices of all meat products, as a group, declined following the high point in September 1940 and at the end of the year were well below the September 1939 prices. Prices paid farmers for all livestock during 1940 averaged near 1939, with declines in hog prices offsetting increases in prices of cattle and lambs.

WAGE payments to labor constitute an important element in the costs of performing most marketing services. Compensation of employees amounts to nearly half of the total expenses of class I railways. In the

food-processing industries, wage payments make up from one-fourth to one-third of value added by manufacture. In wholesale and retail distribution the pay roll is about half the total operating expenses. Changes in hourly wage rates produce important changes in costs of marketing but may be partially or totally offset by increases in labor efficiency.

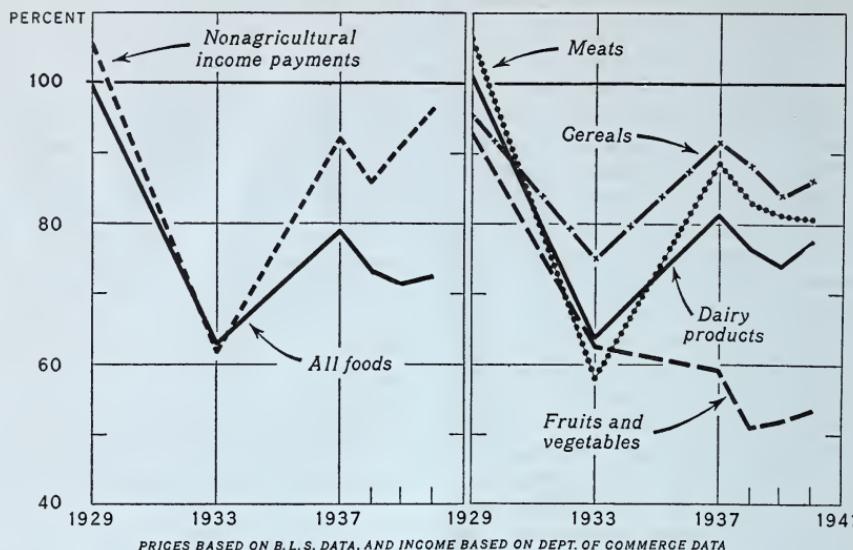
In table 3 are shown indexes of hourly wage rates for the last 6 years in occupations connected with marketing of food products. The dollar margin of 58 foods representing total marketing charges has been closely associated with changes in hourly earnings of all nonagricultural wage workers. During recent years, however, wage rates have increased while the

Table 2.—58 Foods Consumed Annually
By a Typical Workingman's Family—
Index Numbers by Months of Retail
Value, Equivalent Farm Value, and
Marketing Margin, January 1939 to
December 1940

[August 1939 = 100]

Year and month	Farm value	Retail value	Margin	Farm value as percentage of retail value
1939				
January	108	104	101	41
February	108	103	100	41
March	105	103	101	40
April	104	102	101	40
May	102	102	102	39
June	100	101	102	38
July	102	102	102	39
August	100	100	100	39
September	114	105	100	42
October	114	104	98	43
November	116	104	96	44
December	112	103	97	42
1940				
January	112	102	96	42
February	113	105	100	42
March	109	103	99	41
April	110	103	99	41
May	110	104	100	41
June	105	105	105	39
July	108	104	102	41
August	108	103	99	41
September	112	104	98	42
October	114	103	96	43
November	118	103	94	44
December	120	105	96	45

RETAIL PRICES OF IMPORTANT FOOD GROUPS AND
NONAGRICULTURAL INCOME PAYMENTS, UNITED STATES, 1929-40
INDEX NUMBERS (1925-29=100)



marketing margin has declined. Table 3 shows that wage rates in various occupations have not increased with equal rapidity. The advance has been most pronounced in food manufactures, where hourly earnings rose 21 percent during the last 5 years, with most of the increase occurring from 1936 to 1937. For steam railways the total wage increase has been only half as great, most of that occurring from 1937 to 1938. In wholesale trade, wage increases have been substantial, but wages in retail trade have actually declined since 1937 and are at present only 4 percent above 1935.

Table 3.—Hourly Wage Rates—Index Numbers (1935=100)

Year	Steam rail-ways	Food manu-fac-tures	Whole-sale trade	Retail trade
1935	100	100	100	100
1936	101	102	103	100
1937	103	113	108	106
1938	109	117	108	104
1939	109	119	110	105
1940 ¹	110	121	114	104

¹ Preliminary estimate.

Source: U. S. Bureau of Labor Statistics and the Interstate Commerce Commission.

General wage increases and greater employment must increase the earnings of lower income families and thereby increase total expenditures for foods. Farmers can expect to gain from any general rise in wages which is not entirely offset by lowered employment and higher marketing costs.

Transportation costs constitute one of the important elements in the spread between farm and retail prices. Rail freight rates on agricultural products have changed little during the past three years, following the substantial increase of about 5 percent which occurred early in 1938, when the rise in hourly earnings of rail employees took place.

ANY reduction in marketing charges should benefit the consumer through reducing retail prices and improve the position of the farmer by increasing prices which he receives. Reduction of marketing costs could result from breaking up congestion and increasing efficiency at certain points in the marketing process. Improvement of terminal market facilities is a step in this direction.

Detailed study of price trends and marketing costs for food products will become increasingly imperative under the current defense program with its

expansion of industrial production and prospective increases in costs of consumers' goods.

R. O. BEEN.

Interstate Trade Barriers: A Proposal

THE removal of interstate trade barriers has become an important national issue. Farmers, dealers, and consumers throughout the country want to see our marketing laws and regulations overhauled in such a way as to permit free trade without sacrificing any of the legitimate purposes of regulation, such as the protection of public health, the prevention of the spread of insect pests and diseases, and the protection of highways from excessive damage. Many have asked the Bureau for concrete and specific suggestions for accomplishing such a revision of marketing laws and regulations.

There are some practical possibilities for eliminating the worst of the trade barriers in agriculture. State commissioners of agriculture with whom some of these possibilities were discussed in December were very interested. Most of the State legislatures are meeting this year, and many of the State commissioners of agriculture believe that if Federal and State officials could agree on a program there would be a real possibility of getting the necessary Federal and State legislation this year. Also, that inasmuch as trade barriers represent an obvious threat to our defense program, now is an opportune time to push legislation for freer interstate trade.

A comprehensive program for revising all marketing laws and regulations is being studied by an Inter-departmental Committee on Interstate Trade Barriers and by the Council of

A special report issued by the Bureau of Agricultural Economics in March 1939—*Barriers to Internal Trade in Farm Products*—called attention to the rapid growth of discriminatory laws and regulations which have the effect of interstate tariffs and embargoes. The report showed that such laws and regulations are interfering seriously with the free movement and sale of farm products, raising the cost of marketing, increasing prices of food and clothing to the consumer, and lowering the consumption of these products.

Studies by a number of Federal and State agencies have confirmed the Bureau's findings, and have brought to light the existence of many serious trade barriers which were not covered in the Bureau's report. * * * At the last sessions of the State Legislatures in 1939, many proposed additions to State barriers were blocked. At the current sessions (approximately 40 State legislatures meet this year) there is opportunity to repeal at least the worst of the trade barrier laws.

A program of Federal-State co-operation to deal with the "barrier" situation, patterned after existing arrangements for the grading, inspecting, and certifying of farm products, is proposed in the accompanying article.—ED.

State Governments. Meanwhile, I should like to make one particular proposal which in my opinion would go far toward eliminating some of the most serious trade barriers affecting agricultural products. This proposal is made by me as an individual; it does

not commit the Bureau of Agricultural Economics nor the Department of Agriculture in any way. It is made here and now only in the hope that it will start some discussion out of which may grow a concrete program.

Briefly, my proposal is for a cooperative Federal and State program patterned fairly closely after the Federal-State grading and inspection programs.

UNTIL about 25 years ago, non-uniform grades for farm products presented many serious trade barrier problems. For example, wheat which had been inspected and certified as to grade in the producing State might not be acceptable in markets outside the State. Potatoes rated as No. 1 grade in one market might be called No. 2 in another market and sold there at a discount. During the past 25 years this situation has been improved greatly through a program developed and carried out jointly by the Federal and State Departments of Agriculture.

This program has accomplished two things: (1) It has brought about gradually more and more uniformity in the standards and grades used throughout the country; (2) it has provided an inspection service whose certificates of quality are accepted as passports in interstate commerce. A certificate showing that a carload of potatoes has been inspected and is up to the U. S. No. 1 standard is now accepted in any part of the country as an indication of the actual quality.

This standardization and certification service has virtually eliminated trade barriers that once existed because of differences in grading requirements and in inspection techniques for some of the principal agricultural products.

To be sure, there is still need for greater uniformity in the specifications of grades for some products, such as eggs. And there is a very decided need for greater uniformity in requirements concerning marking, packing, and containers.

(One State recently tried to enforce a law requiring that farm products *transported through* the State be marked according to the State law. Requirements in this State are different from those in other States and also different from the requirements of the Federal Government. It is easy to see how interstate commerce would be disrupted if each State tried to regulate the marking and labeling not only of products sold in that State, but also of products transported through that State.)

OUR studies have shown that sanitary laws and regulations have set up a number of monopolistic and discriminatory trade barriers which restrict milk and cream sheds, raise prices to consumers, raise costs to producers, and arbitrarily deny many dairymen the opportunity to sell their products in the most profitable market. There seem to be two basic troubles with milk inspection at the present time: (1) Lack of uniformity in sanitary requirements; (2) the refusal of cities and States to accept outside inspections. These are the same problems which have been met rather successfully in the case of grading.

We need greater uniformity in sanitary requirements, and we need a Federal-State inspection service which can grant a certificate that will serve as a passport by which milk and dairy products can move freely in interstate commerce. Some progress is being made toward greater uniformity in sanitary requirements. Recently 9 midwestern States have been working with the Council of State Governments to get greater uniformity within that region and to provide standard qualifications for dairy inspectors. The United States Public Health Service has been urging for several years the adoption of the so-called "standard milk ordinance."

These definitely are steps in the right direction. However, the worst trade barrier features of milk inspection will not be eliminated until cities and States accept the inspection certificates issued by competent authorities outside the State. This would not necessarily require the compulsory use of Federal grades nor Federal inspectors. Grades for milk and dairy products should be made more uniform, but they do not necessarily need to be the same all over the country. Inspectors might be appointed by States or cities as they now are, but some arrangement would have to be worked out whereby these inspectors could be licensed and supervised by some Federal agency. This would be similar to the present Federal-State program dealing with standards, grades, and inspection for quality.

EVERYONE seems to agree in principle that plant quarantines should be based solely upon known risks of spreading pests and diseases. Regional and national plant boards have made a good deal of progress by eliminating unnecessary quarantines which tend to act as trade barriers and by helping to standardize and unify inspection and certification procedures.

In addition to more uniform quarantine regulations it seems quite evident that we need some kind of reciprocal acceptance of inspections made by competent authorities in other States. This could be done by developing a cooperative Federal-State inspection service which could grant a certificate or passport acceptable in all parts of the country. This sort of arrangement has been discussed from time to time by nurserymen and by some of the plant boards, but no general agreement has as yet been reached.

There are many technical problems in connection with quarantines which I am not competent to discuss, but it does seem to me as an agricultural economist that grading, sanitary regulations, and quarantines can all be

handled by about the same type of cooperative Federal-State program and that in each case the main problem is to set up a competent inspection service which can grant certificates that will be accepted in any market in the country.

LICENSING and registration are, perhaps, a somewhat different problem, but these also might be handled by a program similar to that discussed above. Dealers of various kinds, doing business in more than one State or more than one city, are being required to register many times or to take out many licenses because a large number of the States and many cities each require dealers to register or to take out a license. In most cases fees are charged for registering and licensing. In many cases this is making it difficult for nurserymen, fertilizer companies, and similar dealers to do an interstate business. In some cases the city licenses required for trucking and peddling are so high as to shut out practically all outside competition with local merchants.

It is not the contention that all licensing and registration requirements are bad, nor that all were set up solely as trade barriers. Licensing and registration requirements are often perfectly legitimate, in some cases they are the only practical way of protecting the farmer and the general public from fraud and dishonest practices. Nevertheless, these requirements must be reasonable if we are to have an efficient marketing system. Perhaps the way out of this dilemma is to develop a Federal-State licensing system patterned after the Perishable Agricultural Commodities Act.

Under the P. A. C. Act fruit and vegetable shippers and dealers engaged in interstate commerce are required to have a Federal license. Some States require also that dealers conducting an intrastate business take out a State license. This system has proved effective in eliminating many unfair trade practices and safeguarding

both the farmers and consumers against fraud. From time to time there has been some talk about similar arrangements for licensing other middlemen—egg dealers, for example. If this system were expanded to include interstate dealers and shippers who handle all kinds of farm products, and if the States could supplement such a system by registering persons engaged in intrastate commerce in these products, we might be able to do away with many expensive, annoying, and overlapping requirements of individual States, counties, and cities.

A PROGRAM of the kind proposed here would go far toward eliminat-

ing the worst trade barrier features of grades and standards, sanitary inspection, quarantines, and registration and licensing. It would not take care of some other important trade barrier problems, such as discriminatory laws and regulations on alcoholic beverages, discriminatory taxes such as those imposed on margarine, nor discriminatory laws and regulations in the field of transportation. There probably is no one panacea which will solve the whole trade barrier problem. But I believe the proposed attack would help a great deal and would benefit the farmer, the dealer, and the consumer.

FREDERICK V. WAUGH.

Income by Types of Farming

A NEW approach to finding how various groups of farmers fare under different cost and price conditions is giving an unusually informative picture of farm income problems by type and size of farm. Applied to the Corn Belt, the measure shows a decided economic advantage of livestock systems of farming over cash-grain farming in all but 3 of the past 23 years (fig. 1). Analyses are now under way for the wheat and cotton areas, and similar studies of income in relation to a base period are planned for other regions of the country.

The index itself is designed to reflect as closely as possible the effects of changing conditions on each farmer. When the final results are available they will show how farmers having a given type and size of farm have fared under the crop, price, and cost conditions for each year in the past. They will also serve as a basis for indicating to these farmers the prospects for the future. The index may also be used to estimate for planning agencies and farmers the possible income effects of various agricultural programs on given types and sizes of farms.

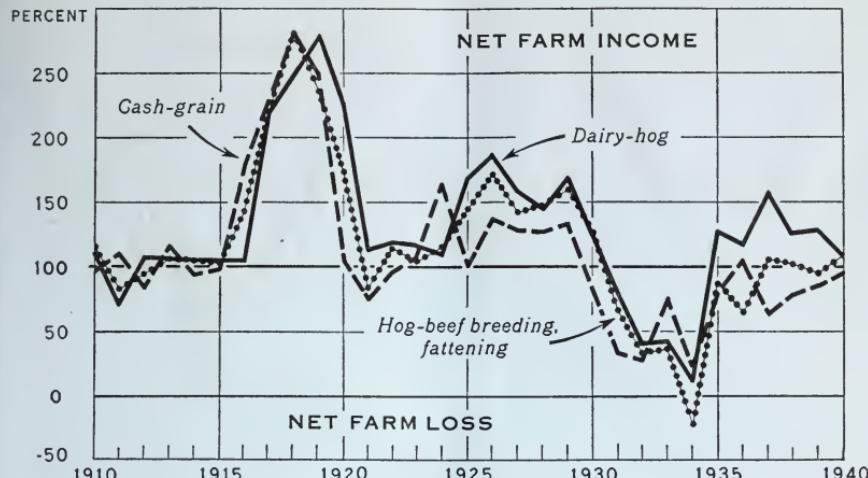
THE organizations of three usual types of farms in the Corn Belt are shown in the accompanying table. Of these, the dairy-hog type has consistently held an advantage since 1918 over cash-grain farms and hog-beef breeding-fattening organizations. Cash-grain farms have the poorest income record during this period. In 2 years of drought (1924 and 1934) and 1 year of depression (1933), the dairy-hog type lost its advantage.

The reason for these momentary lapses is found in the conditions prevailing during these drought and depression years. For example, in 1934, cattle and sheep production was high and the prices of all livestock were comparatively low. Corn, oats, and hay production was low. Cash-grain farmers in such unusual situations are ordinarily in a better position than livestock farmers who have to feed out with high-priced feeds or sell on a distressed market. The cash-grain farmers meanwhile do not have to buy feeds; in fact, they are frequently able to sell at high prices their crops from the year before.

Good farm managers, however, do not gamble on an unusual year. They

FIG. 1. INDICES OF NET FARM INCOME OF CORN BELT FARMS BY TYPE OF FARM

(1910-14 = 100)



plan for the long pull. Under such conditions, livestock farming has been relatively the most profitable over two decades. The implications of this fact reach far beyond the income of the farmer. For example, the national agricultural program is aimed toward soil-conserving systems of farming, systems like the livestock ones described here. Hay crops, small grains, rotation pasture, all fit into a livestock system of farming and into a national conservation program.

THE net incomes shown in figure 1 represent the amount of farm income available for personal expenditure and saving. They include products consumed on the farm, Government payments, carry-overs of products from one year to the next. Other factors affecting income have been accounted for, thus the income represents the amount available for the farm family each year.

How has this purchasing power varied? We know, of course, that high incomes accompanied by high prices of everything farm families must buy are no better than low incomes and low prices of commodities bought. Statistically, our question is: Has the index of farm income changed to the

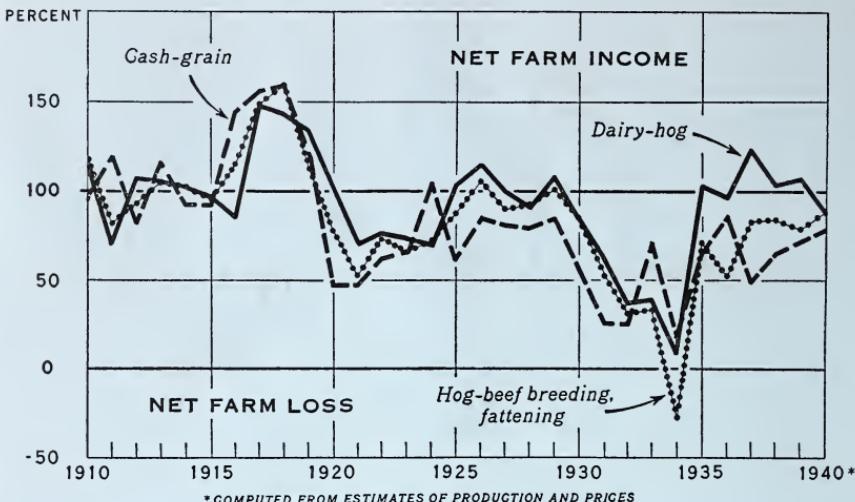
same extent as the index of the prices of commodities and services farmers

Organization of Corn Belt Farms by Type, 1937-39

Item	Type of farm		
	Hog-dairy	Cash grain	Hog-beef breeding, fattening
Acres per farm	118	181	196
Acres in crops	83	156	143
Percent of farm cultivated	71	88	74
Acres in corn	28.7	77.8	52.0
Yield of corn	50.3	59.7	56.4
Acres small grain	24.0	53.9	37.1
Acres hay	14.4	8.4	25.0
Number of cows milked	7.7	4.1	4.6
Cwt. hogs sold	139	66	201
Cwt. cattle sold	30	24	98
Cwt. sheep sold	6.4	1.5	4.5
Proportion of gross income from various sources			
	Percent	Percent	Percent
Corn	45	15	44
Small grain	4	12	4
Other crops	2	3	1
All crops	6	60	9
Hogs	45	15	44
Cattle	10	6	25
Sheep and poultry	5	2	4
All livestock	60	23	73
Dairy products	20	7	6
Poultry products	8	5	6
Wool and other livestock products	1	—	1
All livestock products	29	12	13
Other income	5	5	5
Total	100	100	100

FIG. 2. INDICES OF PURCHASING POWER OF NET FARM INCOME
OF CORN BELT FARMS BY TYPE OF FARM

(1910-14=100)



buy for the family? We compare them both with 1910-14 levels (fig. 2).

It is evident that the purchasing power of net farm income in the Corn Belt has been relatively low since 1919. Significantly, the operators of dairy-hog farms are the only ones of the three groups shown whose purchasing power since 1933 has exceeded that of the base period.

The prices of commodities bought by the farm family have lagged behind and have varied less than has the index of net farm income. That is, when the farm income drops precipitously, the farm family is even worse off than is immediately apparent because the prices the family must pay do not drop so soon nor so far.

THE better showing of these indexes during recent years is some indication that these farmers are on the road to recovery and that recent shifts towards more livestock to use roughages and pasture is a shift in the right direction. This new way of measuring the progress of farmers brings out these shifts because the indexes are constructed for specific types of farms. Applying the index measure to these specific groups of farms brings out the relationships among all the factors

facing farm managers of the Corn Belt and reflects the ways in which they are reacting to various situations.

WYLIE D. GOODSELL.

FATS, OILS: Rise

Higher prices for most fats and oils this year are suggested by the expansion in industrial production and higher incomes of consumers. Prices of lard, tallow, and grease are likely to advance relatively more than prices of other fats, because of prospective changes in the domestic supply situation. Smaller marketings of hogs this year than last mean smaller production of lard and grease. Increased production of vegetable and marine oils, however, is likely to offset most of the decrease in the output of lard and grease.

The general level of prices of fats and oils in 1940 was 5 percent higher than in 1939 but 36 percent below the average for the period 1924-29. Prices of linseed oil, butter, marine oils, and many of the imported oils were moderately to sharply higher in 1940 than in 1939. But prices of lard, tallow, greases, most domestic vegetable oils, and oils imported from the Philippines and the East Indies, declined to lowest levels in 6 or 7 years.

Forests for Conservation and Use

THE United States now has more than 176 million acres of land in national forests and purchase units. The forests (in four instances, purchase units which eventually will be turned into national forests) have been set up in all but 8 States: New York, New Jersey, Massachusetts, Connecticut, Delaware, Maryland, Rhode Island, and Kansas. There are Federal forests in Alaska and Puerto Rico. In size, the public forest holdings vary greatly. In the United States proper, the largest national forest is the Challis, in Idaho, with 2,447,080 acres in Government ownership; the smallest is the Conecuh, in Alabama, with 68,749.

National forests were made up originally of public domain land set apart from time to time for conservation of timber supplies and protection of watersheds. Since 1911, under the Weeks law enacted that year, and the Clarke-McNary amendatory act of 1924, more than 16 million acres have been added by purchase, mainly in the Eastern States. Today, mingled with the 176 million Government acres are about 50 million in privately owned parcels, some large, some small. Private lands more suitable for forests than for other use are bought by the Government as Congress makes funds available.

SETTING aside of lands for national forests was first authorized by act of Congress, March 3, 1891. Now, a half-century later, the United States Forest Service, which administers these public holdings, says that as a whole the national forests are in the best condition of the last 30 or 40 years—and this despite steady cutting out of trees for lumber and other uses, the grazing of millions of sheep and cattle annually, and continual use by recreation seekers and special use "permittees" now numbering upward of 34 million persons a year.

Next month the United States Forest Service celebrates a fiftieth anniversary. It was 50 years ago—in 1891—the Federal Congress authorized the setting aside of lands for national forests. Since then, the system of national forests has been greatly expanded. Vast areas cover the West, and their economic value is no less than their social use. Under right management, the forests are being conserved for the future while being made to serve the needs of the present. How this is being done is revealed in the accompanying article.—Ed.

The foresters point to widespread timber stands improved by thinning and culling out of diseased trees and old snags. To the replanting of more than a million cut-over acres. To the fact that about one-half of the 80 million acres of commercial timber on national forests is under some form of "sustained yield," or selective cutting management, and the remainder protected against the day when it will be in condition for cutting of lumber to begin. To the whittling down of the area annually burned over from an average 8,200 per million acres in 1910-14 to about 1,700 per million in 1935-37.

The record shows, they hold, that commercial and recreational use of forests is not incompatible with true conservation of the resource; that, indeed, right use of growing forests is quite probably the soundest form of conservation in the long run.

RECENTLY, this writer visited a site on the Hoosier National Forest in southern Indiana where a timber sale had been made. As he approached the forest along the road, it was hard to believe that the woods had been systematically put to harvest a few weeks before. The red and white oaks, yellow poplars, hickory,

ash, and beech trees stood there beautifully, with young trees of different ages beneath. It was only when he went into the forest and saw the stumps that he realized how the forester had gone through, marking the mature trees and the defective trees for cutting, and how the local contractor had logged the marked trees off under Forest Service supervision which prevented destruction of young growth and enforced proper disposal of "slash" to forestall fire. Within the general pattern of this forest-conserving method, a total of 1,779,209,000 board feet of timber was cut from national forests in the fiscal year ending last June. Receipts from sale of timber and forest products totaled \$3,871,311. The annual national forest timber cut runs around 4 percent of the cut for the entire country.

In these sales, Forest Service policy is to deal where possible with small local buyers, as opposed to large operators. Large timber sales are encouraged only where the woods and mill operations involved will support local communities or will help thinning and other forestry measures necessary to increase the growth and quality of residual stands. Last fiscal year, there were 27,512 individual cash sales of timber and forest products from national forests. This total included 2,018 sales of forest products, as distinct from timber; that is, maple sugar or turpentine taken from the trees by buyers under Forest Service supervision, tan bark, Christmas trees, ferns, shrubs, leaves for decorative purposes, seedlings and ornamental trees, staves, billets, burls, etc. There were also 6,967 sales of small amounts of timber at cost to individual dwellers within or near the forests for noncommercial home and ranch use. Of the year's sales, 25,037 amounted in value to \$500 or less, 114 to \$1,000 or less, 238 to \$5,000 or less, and 105 to more than \$5,000.

Wood of dead, insect-infested or diseased trees, or trees stagnating in oppressively dense stands, but suitable for fuel, fencing, shed-building, or

mining and prospecting purposes, was given to many forest-country families free of charge, as is Forest Service practice. Except in cases of unusual need, a limit of \$20 in value is put upon the amount of free wood allowed each individual. Sometimes, specific areas are designated where needy persons may go in and cut wood up to the stipulated value. Otherwise, the free-wood takers must have regular permits.

EIIGHTY million acres of range land in national forests are used each year for the feeding of livestock owned by private individuals. In the calendar year 1939, this range land grazed approximately 7,300,000 animals, being a supplement to privately owned or leased range indispensable to the welfare of the herds and flocks. Under Forest Service permits and scales of fees based upon market prices of livestock for the previous year, 1,180,971 head of cattle, 27,897 horses and 220 hogs belonging to 19,065 owners, and 6,125,642 sheep and 5,965 goats belonging to 5,230 owners, foraged during the grazing season on the public range. No charge is made by the Forest Service for the young of the stock. In addition, 82,224 cattle, 47,734 horses, 46,361 hogs, 13,399 sheep, and 6,616 goats, required for work, travel, or food by persons operating under special-use permits on national forest land, were allowed to graze free.

The Forest Service reports that in the Western States the business of livestock and ranch interests with investments of around \$200,000,000 and controlling 4,500,000 acres of cropland and 22,000,000 acres of privately owned range land is largely dependent for successful operation upon the supplemental use of the national forest grazing resource. National forest grazing receipts for the fiscal year 1940 totaled \$1,457,120. Livestock owners using this range employ about 25,000 cowboys and herders annually, but this number is small as compared to the employment the western grass-made meat and wool industry gives to

processors and distributors throughout the country.

Best indication of the validity of the principle of conservation by wise use in connection with national forest range is the fact that the range has been continuously and productively utilized under Forest Service management—and in cooperation with livestock men—for 30 years. Management or, among other conservation practices, measures to adjust the number of animals being grazed to the capacity of the range, were made imperative by overcrowding of the range lands prior to that time. This overcrowding resulted in the historic wars between sheep and cattle men, and in the opinion of experts might well have left the range largely an eroded waste had it continued unchecked. Too close and too frequent cropping of the perennial grass plants literally kills them off, says the Forest Service, while reasonable grazing maintains "the cover" in condition to go on producing forage and protecting the land year after year.

Of the more than 34 million persons who visit national forests each year, the majority are recreation seekers. Forest Service looks back 20 years, when visitors numbered 3 million, and predicts 60 million annually 10 years hence. Great numbers of the visitors are campers and picnickers; others are hunters, hikers, and canoeists; some own summer homes in the forests; there are many tourists and sightseers. Thousands of children needing low-cost vacations are brought each year to the 548 camps suitable for use by organizations—clusters of cabins around a central hall—on national forests by nonprofit social agencies.

In the national forests are more than 50,000 camp and picnic sites. These vary from anchored sets of tables, benches, and outdoor fireplaces, or more extensive recreation groves with open-air pavilions and often beside a lake where swimming is allowed, to deep-woods cabins where hunters and hikers may put up for the

night. These camps only begin to suggest the broad variety of recreational uses: In the forests are 52 wilderness areas, each including more than 5,000 acres, where one may roam at will; 30 hotels and roadhouses; 774 resorts and clubhouses; 13,409 private homes and cottages; and 16 rifle and target ranges—all under permit. On certain special game management areas, annual deer and wild boar hunts are held. Forest Service estimates that only about 1 visitor in 10 thousand commits any act of vandalism against the public property.

As of June 1939 the national forests contained 24,077 miles of forest highways, 118,307 miles of forest development roads, and 157,501 miles of horse and foot trails to serve tourists, vacationists, and other visitors as well as local residents and communities in and near the forests. These roads and trails are of vital importance in fire protection. No tolls or entry fees are charged on national forests. Returns from timber sales, grazing fees and other permissible uses, however, for the fiscal year ending June 30, 1940, are reported by the Forest Service to have totalled \$5,859,183—largest since 1930, when they reached the all-time high of \$6,751,553.

ALAN MACDONALD,
United States Forest Service.

United States production of peanuts in 1940 was the largest on record. The crop totaled 1.6 billion pounds, compared with 1.2 billion in 1939 and with 1.0 billion average for the 10 years, 1929-38. The quantity of farmers' stock peanuts available for crushing from the 1940 crop may exceed 500 million pounds. The greatest use by domestic oil mills previously was in the 1938-39 season, when 260 million pounds were crushed. Purchases of 1940 farmers' stock peanuts by cooperatives operating under a Government diversion program totaled 741 million pounds to early January this year; of this total, 283 million pounds had been diverted to crushing mills.

What's Ahead for American Agriculture?

HOW will a continuation of the European war and of our defense program affect agriculture? Continuation of the war in Europe, with the United Kingdom holding out against Germany, will doubtless continue a heavy draft upon industry in the United States. It will also result in continued restriction on the markets for our surplus farm products. Our own defense program and continuation of the war will greatly increase industrial activity and incomes in the United States and consequently the domestic demand for many farm products.

The demand for more labor in industry and the draft upon manpower for military service will withdraw labor from farms and thus increase the costs of farm production. Defense industry demands will increase the costs of materials and of machinery used in agricultural production. This will increase the difficulties of producers of export farm commodities. Producers dependent primarily upon wheat, cotton, and tobacco for their incomes will be faced with rising costs, without rising incomes to meet these costs. This will increase the burden upon agricultural programs to maintain income and living conditions on the farms in the areas producing these export crops.

To be sure, the increase in the demand for some farm products will offer an opportunity to make some shifts in agricultural production. Farmers will find it possible to produce more dairy products, fruits, vegetables, and beef, and find an outlet for these products; but great shifts sufficient to eliminate export surpluses cannot be made over night; moreover, such shifts would probably be unwise. The

war will come to an end and defense efforts will flatten out. While planning, we must plan to minimize the let-down, to avoid, insofar as possible, such great depressions as we had in 1921 and again in 1931 and 1932.

PERHAPS we cannot be very realistic now in appraising what markets Europe will offer to us when peace is reestablished there. Certainly the winner and the conditions of peace will have some effects upon those markets. If the markets are opened—*whoever may win the war*—there will be an accumulated demand for cotton and for some foodstuffs from the United States and other overseas countries.

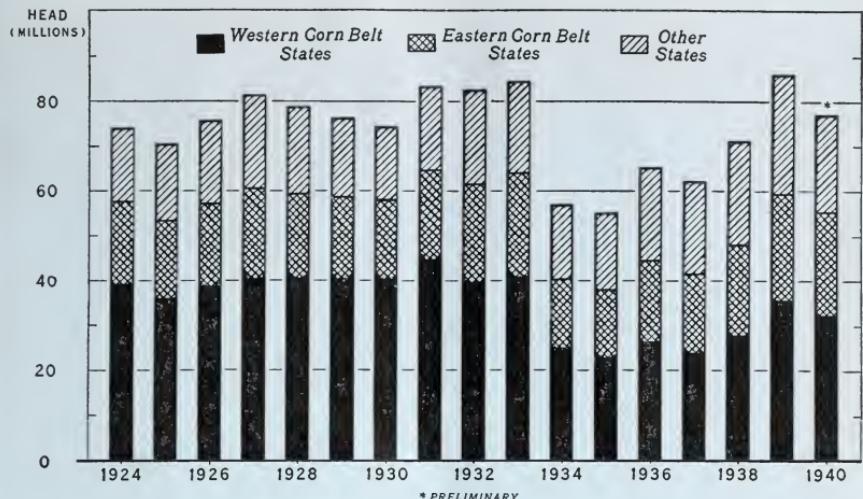
We may find at the end of the war an opportunity to unload a part of our holdings of cotton, but not as much as has already accumulated. * * * We can hardly expect to find an outlet for much wheat, in view of all the surpluses accumulating elsewhere. * * * We may find an outlet for some lard and pork, and some more fruits and vegetables.

It seems hardly probable, however, that the European markets will offer much of an outlet to the United States for long, *whoever wins the war*. European purchasing power will again be short, and there will be a strong incentive for increasing domestic production. The competition to be expected from other countries for the European market will be undiminished. We must prepare to absorb our own production, to a much greater extent than we did in the 1920's, following the World War.

O. C. STINE.

Good Risk.—The Farm Security Administration recently announced that its tenant purchase borrowers had repaid 97.4 percent of the principal and interest due on their loans up to June 30, 1940. Tenants and farm workers buying farms with the aid of Government loans had made advance payments of \$196,765—more than 8 times the total amount of delinquencies.

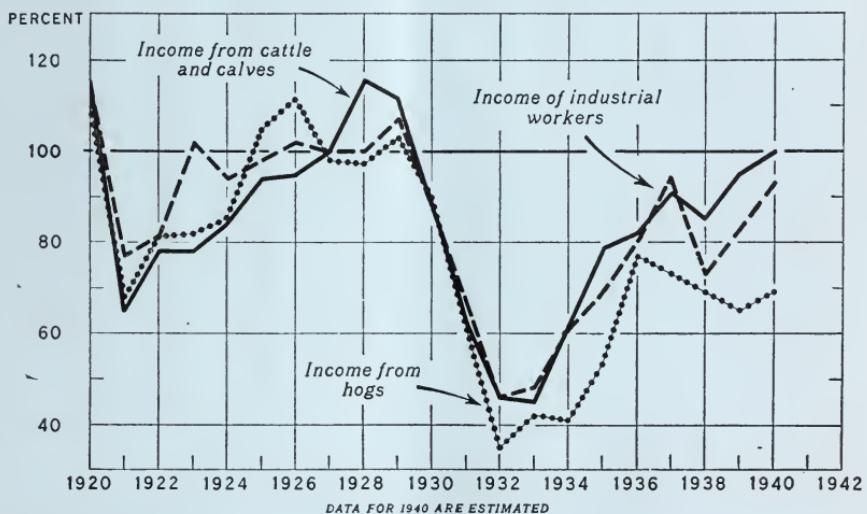
ANNUAL PIG CROP



The 1940 pig crop totaled 77 million head, compared with the record crop of 85.9 million head in 1939. More than half the decrease in 1940 was in States outside the Corn Belt. The decrease in the Eastern Corn Belt was small, but the number of pigs raised in the Western Corn Belt in 1940 was 10 percent smaller than a year earlier. The decrease in the 1940 pig crop means smaller marketings of hogs this year. Consumer demand for meats is expected to improve during this period, and prices of hogs will be considerably higher this year than last.

CASH FARM INCOME FROM CATTLE AND CALVES AND FROM HOGS, AND INCOME OF INDUSTRIAL WORKERS, UNITED STATES, 1920-40

INDEX NUMBERS (1924-29=100)



The relatively low level of income from hogs in recent years is partially explained by the weaker export demand for pork and lard and the increased supplies of vegetable oils which compete with lard. There are also some indications that the domestic consumer demand for beef has strengthened relative to the demand for pork.

Economic Trends Affecting Agriculture

Year and month	Indus- trial pro- duction (1935- 39=100) ¹	Income of indus- trial workers (1924- 29=100) ²	Cost of living (1924- 29=100) ³	Whole- sale prices of all commod- ities ⁴	Prices paid by farmers for commodities used in ⁵			Farm wages	Taxes
					Living	Pro- duc- tion	Living and produc- tion		
1925	91	98	101	151	164	147	157	176	270
1926	96	102	102	146	162	146	155	179	271
1927	95	100	100	139	159	145	153	179	277
1928	99	100	99	141	160	148	155	179	279
1929	110	107	99	139	158	147	153	180	281
1930	91	88	96	126	148	140	145	167	277
1931	75	67	88	107	126	122	124	130	253
1932	58	46	79	95	108	107	107	96	219
1933	69	48	75	96	109	108	109	85	187
1934	75	61	77	109	122	125	123	95	178
1935	87	69	79	117	124	126	125	103	180
1936	103	80	80	118	122	126	124	111	182
1937	113	94	83	126	128	135	130	126	187
1938	88	73	81	115	122	124	122	125	186
1939	108	83	80	113	120	122	121	123	190
1940	122	94	81	115	—	—	122	126	—
1940—January	122	93	80	116	—	—	122	119	—
February	116	89	81	115	—	—	122	—	—
March	113	87	81	114	121	125	123	—	—
April	111	86	81	115	—	—	123	124	—
May	114	87	81	114	—	—	123	—	—
June	121	89	81	113	121	125	123	—	—
July	121	91	81	113	—	—	122	129	—
August	121	95	81	113	—	—	122	—	—
September	125	98	81	114	121	123	122	—	—
October	129	100	81	115	—	—	122	129	—
November	132	102	81	116	—	—	122	—	—
December	136	107	81	117	—	—	122	—	—
1941—January ⁷	—	—	—	—	—	—	123	124	—

Year and month	Index of prices received by farmers (August 1909-July 1914=100)							Ratio of prices received to prices paid
	Grains	Cotton and cotton- seed	Fruits	Truck crops	Meat ani- mals	Dairy prod- ucts	Chick- ens and eggs	
1925	157	177	172	153	140	153	163	156
1926	131	122	138	143	147	152	159	145
1927	128	128	144	121	140	155	144	139
1928	130	152	176	159	151	158	153	149
1929	120	144	141	149	156	157	162	146
1930	100	102	162	140	133	137	129	126
1931	63	63	98	117	92	108	100	87
1932	44	47	82	102	63	83	82	65
1933	62	64	74	105	60	82	75	70
1934	93	99	100	103	68	95	89	90
1935	103	101	91	125	118	108	117	108
1936	108	100	100	111	121	119	115	114
1937	126	95	122	123	132	124	111	121
1938	74	70	73	101	114	109	108	95
1939	72	73	77	105	110	104	94	93
1940	85	81	79	114	108	113	96	98
1940—January	90	85	66	121	103	119	91	99
February	91	85	76	159	101	118	98	101
March	92	85	73	118	102	114	83	97
April	96	85	81	128	104	110	82	98
May	92	83	88	117	108	106	84	98
June	83	81	104	112	102	104	81	95
July	78	80	89	98	91	105	88	95
August	76	77	79	107	110	109	90	96
September	77	76	73	114	114	111	104	97
October	80	78	79	99	112	116	112	99
November	83	79	71	98	112	121	120	99
December	81	79	75	93	111	128	122	101
1941—January	84	80	78	117	128	121	100	104

¹ Federal Reserve Board, adjusted for seasonal variation. Revised August 1940.

² Adjusted for seasonal variation.

³ Monthly indexes for months not reported by the Bureau of Labor Statistics are interpolated by use of the National Industrial Conference Board cost-of-living reports. Revised.

⁴ Bureau of Labor Statistics index with 1926=100, divided by its 1910-14 average of 68.5.

⁵ These indexes are based on retail prices paid by farmers for commodities used in living and production reported quarterly for March, June, September, and December. The indexes for other months are interpolations between the successive quarterly indexes.

⁶ Index of farm real estate taxes per acre. Base period represents taxes levied in the calendar years 1909-13, payable mostly within the period Aug. 1, 1909-July 31, 1914. ⁷ Preliminary.

NOTE.—The index numbers of industrial production and of industrial workers' income shown above are not comparable in several respects. The base periods are different. The production index includes only mining and manufacturing; the income index also includes transportation. The production index is based on volume only, whereas the income index is affected by wage rates as well as by time worked. There is usually a time lag between changes in volume of production and in workers' income, since output can be increased or decreased to some extent without much change in the number of workers.